AMENDMENT OF SOLICITATION/MODIFICATION OF CONTRACT				1. C	ONTRACT ID CO	PAGE OF PAGES	
2. AMENDMENT/MODIFICATION NO. 0004	3. EFFECTIVE DA 17 July 2000	ATE	4. REQUISITION/PURCHAS	ION/PURCHASE REQ. NO.			NO. (If applicable)
6. ISSUED BY CO	DE		7. ADMINISTERED BY (If other than Item 6)			CODE	
USACE, Philadelphia (CENAP-CT-C) POC: David Dilks 100 Penn Square East, Wanamaker Buildin Philadelphia, Pennsylvania 19107-3390	ng						
8. NAME AND ADDRESS OF CONTRACTOR (No., street, county, State and ZIP Code)				(√)	9A. AMENDME DACW61-0	ATION NO.	
				×	9B. DATED (SI 14 June 200	,	
					10A. MODIFIC NO.	ATION OF CON	TRACTS/ORDER
CODE	FACILITY CODE				10B. DATED (S	SEE ITEM 13)	
		LIES TO A	AMENDMENTS OF SO	DLIC	ITATIONS		
The above numbered solicitation is amended as settended.	et forth in Item 14. The	hour and da	ate specified for receipt of Off	ers	X is ex	xtended, i	s not ex-
Offers must acknowledge receipt of this amendment price	or to the hour and date	specified in	the solicitation or as amende	ed, by	one of the followi	ng methods:	
(a) By completing Items 8 and 15, and returning submitted; or (c) By separate letter or telegram which in MENT TO BE RECEIVED AT THE PLACE DESIGNATE IN REJECTION OF YOUR OFFER. If by virtue of this an letter, provided each telegram or letter makes reference	D FOR THE RECEIPT	OF OFFER	RS PRIOR TO THE HOUR AI	ND DA	ATE SPECIFIED I	MAY RESULT	e offer
12. ACCOUNTING AND APPROPRIATION DATA (If re Rehabilitation of Wilmington Harbor South	h Jetty, Wilmingt						
IT MODIFI	ESTHE CONTRA	ACT/ORD	IFICATIONS OF CON ER NO. AS DESCRIB	ED I	N ITEM 14.		
A. THIS CHANGE ORDER IS ISSUED PURSUAI TRACT ORDER NO. IN ITEM 10A.	NT TO: (Specify author	ity) THE CH	IANGES SET FORTH IN ITE	M 14	ARE MADE IN TI	HE CON-	
B. THE ABOVE NUMBERED CONTRACT/ORDE appropriation date, etc.) SET FORTH IN ITEM	R IS MODIFIED TO R 14, PURSUANT TO TI	EFLECT TH HE AUTHOR	IE ADMINISTRATIVE CHANG RITY OF FAR 43.103(b).	GES ((such as changes in	n paying office,	
C. THIS SUPPLEMENTAL AGREEMENT IS ENTE	ERED INTO PURSUAN	NT TO AUTH	HORITY OF:				
D. OTHER (Specify type of modification and authority	ty)						
E. IMPORTANT: Contractor is not,	is require	d to sign	this document and ret	urn	C	opies to the i	ssuing office.
14. DESCRIPTION OF AMENDMENT/MODIFICATION	(Organized by UCF sect	ion headings,	including solicitation/contract	subje	ct matter where fea	sible.)	
Please indicate receipt of this Amendment Failure to acknowledge all Amendments m				l Aw	ard) as Amer	ndment Num	ber 0004.
THE BID OPENING DATE IS HEREBY	EXTENDED TO	27 JULY	2000, 1:00 PM.				
Except as provided herein, all terms and conditions of the and effect.	e document reference	d in Item 9A	or 10A, as heretofore change	ed, rer	mains unchanged	and in full force	
15A. NAME AND TITLE OF SIGNER (Type or print)			16A. NAME AND TITLE OF CONTRACTING OFFICER (Type or print)				
15B. CONTRACTOR/OFFEROR	15C. DAT	E SIGNED	16B. UNITED STATES OF	AMER	RICA		16C. DATE SIGNED
(Signature of person authorized to sign)			BY(Signate	re of	Contracting Office		

14. DESCRIPTION OF AMENDMENT

a. <u>GENERAL</u>: All pages included in this amendment but not referred to below have been included for the purpose of providing the opposite sides of the amended sheets.

b. SPECIFICATIONS:

- (1) <u>SECTION 03307</u>: Please <u>delete</u> page 03307-5 and <u>substitute</u> new page 03307-5 annotated Amendment No. 0004, which is <u>attached</u> hereto.
- c. Please indicate receipt of this amendment on Standard Form 1442 (SOLICITATION, OFFER, AND AWARD) as Amendment 0003. Failure to acknowledge all amendments may be cause for rejection of the bid.

2.1.3.2 Water-Reducing or Retarding Admixture

Water-reducing or retarding admixture shall meet the requirements of ASTM C 494, Type A, B, or D. High-range water reducing admixture Type F may be used only when approved, approval being contingent upon particular placement requirements as described in the Contractor's Quality Control Plan.

2.1.4 Water

Water for mixing and curing shall be fresh, clean, potable, and free from injurious amounts of oil, acid, salt, or alkali, except that unpotable water may be used if it meets the requirements of COE CRD-C 400.

2.1.5 Curing Materials

Curing materials shall conform to the following requirements.

2.1.5.1 Impervious Sheet Materials

Impervious sheet materials, ASTM C 171, type optional, except polyethylene film, if used, shall be white opaque.

2.1.5.2 Membrane-Forming Curing Compound

ASTM C 309, Type 1, Class B.

PART 3 EXECUTION

3.1 PREPARATION

3.1.1 Preparation of Surfaces to Receive Concrete

Exposed surfaces of the existing sheet piles that will be in contact with concrete shall be cleaned such that they are free of all visible oil, grease, dirt, dust, loose mill scale, loose rust, and loose paint. Tightly adherent mill scale, rust, and paint may remain on the surface. Mill scale, rust, and paint are considered tightly adherent if they cannot be removed by lifting with a dull putty knife. These requirements are in accordance with SSPC-SP 7. Note that at locations where studs are to be attached, the surface needs to be cleaned to "near-white" as per SSPC-SP 10.

3.1.2 Embedded Items

Reinforcement shall be secured in place; anchors, and other embedded items shall have been positioned. Internal ties shall be arranged so that when the forms are removed all metal will be not less than 2 inches from concrete surfaces permanently exposed to view or exposed to water on the finished structures. Embedded items shall be free of oil and other foreign matters such as loose coatings or rust, paint, and scale. The embedding of wood in concrete will be permitted only when specifically authorized or directed. All equipment needed to place, consolidate, protect, and cure the concrete shall be at the placement site and in good operating condition.

3.1.3 Formwork Installation

Formwork fabrication shall have been completed in accordance with Section 03101 of this Specification.

3.1.4 Production of Concrete

3.1.4.1 Ready-Mixed Concrete

Ready-mixed concrete shall conform to ASTM C 94 except as otherwise specified.

3.1.4.2 Batching and Mixing Equipment

The contractor shall have the option of using an on-site batching and mixing facility. The facility shall provide sufficient batching and mixing equipment capacity to prevent cold joints. The method of measuring materials, batching operation, and mixer shall be submitted for review. On-site plant shall conform to the requirements of either ASTM C 94 or ASTM C 685.

3.2 CONVEYING AND PLACING CONCRETE

Conveying and placing concrete shall conform to the following requirements.

3.2.1 General

Concrete placement shall not be permitted when weather conditions prevent proper placement and consolidation without approval. When concrete is mixed and/or transported by a truck mixer, the concrete shall be delivered to the site of the work and discharge shall be completed within 1-1/2 hours or 45 minutes when the placing temperature is 85 degrees F or greater unless a retarding admixture is used. Concrete shall be conveyed from the mixer to the forms as rapidly as practicable by methods which prevent segregation or loss of ingredients. Concrete shall be in place and consolidated within 15 minutes after discharge from the mixer. Concrete shall be deposited as close as possible to its final position in the forms and be so regulated that it may be effectively consolidated in horizontal layers 18 inches or less in thickness with a minimum of lateral movement. The placement shall be carried on at such a rate that the formation of cold joints will be prevented.

3.2.2 Underwater Concrete Placement Operation

Concrete shall be deposited in water by use of a concrete pump. The methods and equipment used shall be in accordance with ACI 304R Chapter 8, and meet the approval of the Contracting Officer. The pipeline shall be inserted in the formwork to the top of the working pad and then the concrete shall be placed to the elevation shown on the contract drawings. The pipeline shall be watertight and have a minimum 4 inch inside diameter to permit a free flow of concrete and a maximum outside diameter that will fit into the formwork. The pipeline shall be sealed prior to initial placement by use of a plate and gasket tied to the mouth pipe. The concrete shall be deposited so that it enters the mass of the previously placed concrete from within, displacing water with a minimum disturbance to the surface of the concrete. The discharge end of the pipeline shall be kept continuously submerged in the concrete. All vertical movements of the pipe must be done slowly and carefully to prevent loss of seal. The underwater seal at the start of placing shall not produce undue turbulence in the water. The pipeline shall be kept full of concrete to a point well above the water surface. Placement shall proceed without interruption until the concrete has been brought to the required height. Concrete shall not be deposited in running water or in water with a temperature below 35 degrees F.

3.2.3 Consolidation

Each layer of concrete shall be consolidated by internal vibrating equipment. Internal vibration shall be systematically accomplished by